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Supplementary table 1. Questions used to assess health status

Mobility	(1) Overall in the last 30 days, how much difficulty did you have with moving around? (2) In the last 30 days, how much difficulty did you have in vigorous activities, such as running 3 km (or equivalent) or cycling?
Pain/ discomfort	(1) Overall in the last 30 days, how much of bodily aches or pains did you have? (2) In the last 30 days, how much bodily discomfort did you have?
Cognition	(1) Overall in the last 30 days, how much difficulty did you have with concentrating or remembering things? (2) In the last 30 days, how much difficulty did you have in learning a new task (for example, learning how to get to a new place, learning a new game, learning a new recipe etc.)?
Sleep/energy	(1) Overall in the last 30 days, how much of a problem did you have with sleeping, such as falling asleep, waking up frequently during the night or waking up too early in the morning? (2) In the last 30 days, how much of a problem did you have due to not feeling rested and refreshed during the day (e.g., feeling tired, not having energy)?

Supplementary table 2. Countries included in the analysis and their sample size

Country	N
Bangladesh	1,203
Bosnia and Herzegovina	120
Brazil	1,157
Burkina Faso	431
Chad	254
China	59
Comoros	295
Croatia	113
Czech Republic	75
Dominican Republic	471
Ecuador	418
Estonia	82
Ethiopia	570
Georgia	211
Ghana	258
Hungary	109
India	1,368
Ivory Coast	213
Kazakhstan	3,534
Kenya	314
Laos	135
Malawi	616
Malaysia	106
Mali	216
Mauritania	133
Mauritius	438
Mexico	2,044
Myanmar	137
Namibia	302
Nepal	1,491
Pakistan	280
Paraguay	652
Philippines	432
Republic of Congo	116
Russia	396
Senegal	170
Slovakia	70
South Africa	280
Sri Lanka	3,136
Swaziland	659
Tunisia	451
Ukraine	256
Uruguay	316
Vietnam	43
Zambia	271
Zimbabwe	449

Supplementary table 3. Association between sociodemographic factors and physical activity levels (minutes per week)

Characteristic	Category	Model 1	95%CI	Model 2	95%CI
		b-coefficient		b-coefficient	
Gender	Female	Ref.		Ref.	
	Male	109.48***	[73.23,145.72]	38,41	[-0.80,77.62]
Age (years)	18-24	Ref.		Ref.	
	25-34	107.10***	[50.57,163.63]	19,89	[-39.80,79.59]
	35-44	125.83***	[71.14,180.52]	13,42	[-48.49,75.34]
	45-54	57,3	[-1.10,115.71]	-25,13	[-89.94,39.68]
	55-64	-112.90***	[-174.46,-51.35]	-179.59***	[-247.72,-111.46]
	≥65	-408.37***	[-465.05,-351.69]	-407.35***	[-470.74,-343.96]
Marital status	Married/cohabiting	Ref.		Ref.	
	Other	-68.52***	[-105.10,-31.95]	-74.50***	[-111.69,-37.31]
Education	<Secondary	Ref.		Ref.	
	≥Secondary completed	-95.74***	[-139.11,-52.37]	-38,53	[-89.03,11.97]
Wealth	Poorest	Ref.		Ref.	
	Poorer	-32,16	[-79.02,14.70]	-22,95	[-69.90,23.99]
	Middle	-43,07	[-93.16,7.02]	-27,58	[-79.90,24.74]
	Richer	-116.99***	[-170.60,-63.37]	-94.39***	[-149.60,-39.17]
	Richest	-207.81***	[-261.56,-154.05]	-166.93***	[-225.92,-107.94]
Unemployed	No	Ref.		Ref.	
	Yes	-222.22***	[-260.80,-183.63]	-226.55***	[-265.85,-187.25]
Setting	Rural	Ref.		Ref.	
	Urban	-150.86***	[-200.14,-101.57]	-91.83***	[-144.17,-39.50]

Model 1: Adjusted for gender, age and country. Estimate for age was only adjusted for gender and country, and that of gender was only adjusted for age and country. Model 2: Adjusted for all covariates in the Table and country.

* p<0.05, ** p<0.01, *** p<0.001

Supplementary table 4. Association between health behaviours and physical activity levels (minutes per week)

Characteristic	Category	Model 1		Model 2	
		b-coefficient	95%CI	b-coefficient	95%CI
Current smoking	No	Ref.		Ref.	
	Yes	33,38	[-6.15,72.91]	55.88*	[9.25,102.51]
Fruit consumption (servings/day) ^a	≥5	Ref.		Ref.	
	<5	-76,25	[-155.91,3.40]	-64,86	[-145.12,15.39]
Vegetable consumption (servings/day) ^a	≥5	Ref.		Ref.	
	<5	-93.17*	[-169.23,-17.11]	-98.95*	[-177.20,-20.71]
Alcohol consumption	Lifetime abstainer	Ref.		Ref.	
	Non-heavy	-21,67	[-65.76,22.41]	-5,98	[-60.06,48.09]
	Infrequent heavy	-71,49	[-159.63,16.64]	-72,94	[-160.18,14.31]
	Frequent heavy	-117,01	[-248.81,14.80]	-43,83	[-200.36,112.70]

Model 1: Adjusted for gender, age and country. Model 2: Adjusted for all covariates in the Table and country.

^a Mexico is not included as data on fruit and vegetable consumption were not collected.

* p<0.05

Supplementary table 5. Association between mental health factors and physical activity levels (minutes per week)

Characteristic	Category	Model 1		Model 2	
		b-coefficient	95%CI	b-coefficient	95%CI
Depression	No	Ref.		Ref.	
	Yes	-9,8	[-52.83,33.24]	14,68	[-29.93,59.30]
Sleep/energy ^a	per unit increase	-19.59**	[-25.71,-13.47]	-16.81**	[-23.38,-10.24]
Cognition ^a	per unit increase	-15.21**	[-21.60,-8.81]	-9.69*	[-16.76,-2.63]

Model 1: Adjusted for gender, age and country.

Model 2: Adjusted for all covariates in the Table and country.

^a These variables had scores ranging from 0 to 10 (higher scores indicating worse conditions) and were included in the models as continuous variables

* p<0.01, **p<0.001

Supplementary table 6. Association between physical health factors and physical activity levels (minutes per week)

Characteristic	Category	Model 1		Model 2	
		b-coefficient	95%CI	b-coefficient	95%CI
Visual impairment	No	Ref.		Ref.	
	Yes	-132.10**	[-209.83,-54.37]	-82,5	[-168.36,3.37]
Hearing problem	No	Ref.		Ref.	
	Yes	-124.80**	[-188.67,-60.93]	-81.15*	[-150.19,-12.11]
Arthritis	No	Ref.		Ref.	
	Yes	-3,81	[-48.37,40.74]	31,91	[-16.90,80.72]
Angina	No	Ref.		Ref.	
	Yes	-38.20*	[-75.04,-1.35]	-2,92	[-44.74,38.90]
Asthma	No	Ref.		Ref.	
	Yes	-66.05*	[-121.91,-10.20]	-59,85	[-122.49,2.79]
Diabetes	No	Ref.		Ref.	
	Yes	-72.60*	[-143.41,-1.80]	-44,75	[-121.61,32.10]
Pain/discomfort ^a	per unit increase	-23.37**	[-29.55,-17.18]	-15.70**	[-23.49,-7.92]
Mobility ^a	per unit increase	-26.67**	[-33.07,-20.26]	-18.96**	[-26.59,-11.33]

Model 1: Adjusted for gender, age and country.

Model 2: Adjusted for all covariates in the Table and country.

^aThese variables had scores ranging from 0 to 10 (higher scores indicating worse conditions) and were included in the models as continuous variables

* p<0.05, ** p<0.001